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10/684,417

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Dong-Soo Nam

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38209

7590

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EXAMINER

MORRISON, THOMAS A

ART UNIT

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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/684,417	<b>Applicant(s)</b> NAM, DONG-SOO	
	<b>Examiner</b> Thomas A. Morrison	<b>Art Unit</b> 3653	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED. (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 02 October 2007.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6 and 10-25 is/are rejected.
- 7) ☒ Claim(s) 7-9 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                                | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

1. Claims 1-6, 10-14 and 19-25 are rejected under 35 U.S.C. 102(b) as being anticipated by Japanese Publication No. 4-72246 (hereinafter "JP'246").

Regarding claim 1, Figs. 1-4 show a paper-discharging apparatus used with an image-forming device, the paper-discharging apparatus provided with paper-discharging rollers (2a) and idle rollers (3a) disposed in a paper-discharging port side of the image forming device, in which a sheet of paper is discharged through the paper-discharging rollers (2a) and the idle rollers (3a), the paper-discharging apparatus comprising:

a supporting plate (11 in Fig. 1 or i in Fig. 4) coupled at opposite ends thereof (see Fig. 2) to the image-forming device and installed at the paper-discharging port side of the image-forming device;

a supporting bracket (6 in Fig. 1 or d in Fig. 4) coupled to the supporting plate (11 in Fig. 1 or i in Fig. 4) to rotatably support the idle rollers (3a) facing the paper-discharging rollers (2a); and

a spacing adjustment unit (including 8 in Fig. 1 or including f in Fig. 4) disposed between the idle rollers (3a) to constantly maintain a contact pressure between the paper-discharging rollers (2a) and the idle rollers (3a).

Regarding claim 2, Figs. 1-4 show that the spacing adjustment unit (including 8 in Fig. 1 or including f in Fig. 4) comprises:

an elastic member (8 in Fig. 1 or f in Fig. 4) provided between the supporting plate (11 or i) and the supporting bracket (6 or d) so that opposite ends thereof abut with the supporting bracket (6 or d) and the supporting plate (11 or i), respectively.

Regarding claim 3, Figs 1-4 show that the supporting plate (11 or i) and the supporting bracket (6 or d) are connected to be movable with respect to each other.

Regarding claim 4, Figs. 1-4 show that the spacing adjustment unit (including 8 in Fig. 1 or including f in Fig. 4) further comprises:

a guide unit (including 9 in Fig. 1 or including g in Fig. 4) suppressing transverse and bending movements of the elastic member.

Regarding claim 5, Figs. 1-4 show that the guide unit (including 9 in Fig. 1 or including g in Fig. 4) comprises:

at least one clamping boss (9 or g) protruding from one of the supporting plate (11 or i) and the supporting bracket such that the clamping boss (9 or g) is located between the supporting plate (11 or i) and the supporting bracket (6 or d) when the supporting plate (11 or i) and the supporting bracket (6 or d) are assembled.

Regarding claim 6, Figs. 1-4 show that the elastic member (8 or f) comprises:

a coil spring installed to wrap around a circumferential surface of the clamping boss (9 or g).

Regarding claim 10, Figs. 1-4 show a paper-discharging apparatus to discharge a sheet of paper between a paper-discharging roller (2a) and an idle roller (3a) which are disposed in a paper-discharging port side of an image-forming device, comprising:

a supporting plate (5 in Fig. 1 or b in Fig. 4) formed on the paper-discharging port side of the image-forming apparatus having opposite ends thereof fixedly coupled to the image-forming apparatus (see e.g., Fig. 2);

a supporting bracket (6 in Fig. 1 or d in Fig. 4) having a middle portion formed between opposite ends thereof, on which the idle roller (3a) is rotatably mounted to contact the paper-discharging roller (2a); and

a spacing adjustment unit (including 11 and 8 in Fig. 1 or including i and f in Fig. 4) to flexibly couple the supporting plate (5 or b) and the middle portion of the supporting bracket (6 or d) to adjust a distance between the supporting plate (5 or d) and the middle portion of the supporting bracket (6 or d) when an external force is exerted on one of the supporting plate (5 or b) and the supporting bracket (6 or d). Thus, all of the limitations of claim 10 are met by JP'246.

Alternatively, in claim 10 in the recitation, "a spacing adjustment unit to flexibly couple the supporting plate and the middle portion of the supporting bracket **to adjust a distance between the supporting plate and the middle portion of the supporting bracket when an external force is exerted on one of the supporting plate and the supporting bracket**, the bolded portion of this recitation is a "conditional limitation" that need not ever occur. For example, an external force may never get exerted on the supporting plate or the supporting bracket. Since this condition may never occur, this bolded portion of this recitation does not distinguish claim 10 from the prior art apparatus of JP'246.

Regarding claim 11, Figs. 1-4 show that the spacing adjustment unit (including 11 and 8 in Fig. 1 or including i and f in Fig. 4) controls the supporting bracket (6 or d) to maintain a contact pressure generated between the paper-discharging roller (2a) and the idle roller (3a) constant while adjusting the distance between the supporting plate (5 or b) and the middle portion of the supporting bracket (6 or d).

Regarding claim 12, Figs. 1-4 show that the middle portion of the supporting bracket (6 or d) is spaced-apart from the supporting plate (5 or b) by the distance in a direction perpendicular to the paper disposed between the paper-discharging roller (2a) and the idle roller (3a).

Regarding claim 13, Figs. 1-4 show that when the external force is exerted on one of the supporting plate and the supporting bracket, a portion of the supporting plate moves toward the middle portion of the supporting bracket while a distance between the middle portion of the supporting bracket and the paper-discharging roller is maintained constant. More specifically, in the recitation “wherein when the external force is **exerted on one of the supporting plate and the supporting bracket**, a portion of the supporting plate moves toward the middle portion of the supporting bracket while a distance between the middle portion of the supporting bracket and the paper-discharging roller is maintained constant”, the bolded portion of this recitation is a “conditional limitation” that need not ever occur. As explained above in the rejection of claim 10, an external force may never get exerted on the supporting plate or the supporting bracket. As such, this recitation does not distinguish claim 13 from the prior art apparatus of JP’246.

Regarding claim 14, Figs. 1-4 show that the spacing adjustment unit (including 11 and 8 in Fig. 1 or including i and f in Fig. 4) comprises:

an elastic member (8 or f) disposed between the supporting plate (5 or b) and the middle portion of the supporting bracket (6 or d) to elastically adjust the distance between the supporting plate (5 or b) and the middle portion of the supporting bracket (6 or d).

Regarding claim 19, Figs. 1-4 show a paper-discharging apparatus to discharge a sheet of paper between a plurality of paper-discharging rollers (2a) and a plurality of idle rollers (3a), which are rotated by corresponding ones of the paper-discharging rollers (2a) in an image-forming device, the paper-discharging apparatus comprising:

a supporting plate (5 in Fig. 1 or b in Fig. 4) formed on a paper-discharging port side of the image-forming device having opposite ends thereof mounted on the image forming device (see e.g., Fig. 2);

a supporting bracket (6 in Fig. 1 or d in Fig. 4) having a middle portion formed between opposite ends thereof, on which the idle rollers (3a) are rotatably mounted to contact corresponding ones of the paper-discharging rollers (2a); and

a spacing adjustment unit (including 11 and 8 in Fig. 1 or including i and f in Fig. 4) disposed between the middle portion of the supporting bracket (6 in Fig. 1 or d in Fig. 4) and the supporting plate (5 or b) to flexibly couple the supporting plate (5 or b) with the middle portion of the supporting bracket (6 or d) to maintain a contact pressure generated between corresponding ones of the paper-discharging rollers (2a) and the

idle rollers (3a) regardless of an external force exerted on one of the supporting plate (5 or b) and the supporting bracket (6 or d).

Regarding claim 20, Figs. 1-4 show that a distance between the supporting plate (5 or b) and the middle portion of the supporting bracket (6 or d) varies according to the spacing adjustment unit (including 11 and 8 or including l and f) while the contact pressure is maintained constant.

Regarding claim 21, Figs. 1-4 show that the middle portion of the supporting bracket (6 or d) is spaced-apart from the supporting plate (5 or b) by a distance which varies according to deformation of the supporting plate (5 or b).

Regarding claim 22, Figs. 1-4 show that a distance between the middle portion of the supporting bracket (6 or d) and the paper-discharging rollers (2a) is maintained constant.

Regarding claim 23, Figs. 1-4 show that the middle portion of the supporting bracket (6 or d) is not deformed in a direction perpendicular to an axis passing through a center of each of the paper-discharging rollers (2a) while the supporting plate (5 or b) is elastically deformed. Regarding the recitation "wherein the middle portion of the supporting bracket is not deformed in a direction perpendicular to an axis passing through a center of each of the paper-discharging rollers **while the supporting plate is elastically deformed**", the bolded portion of this recitation is a "conditional limitation" that need not ever occur. For example, the supporting plate may never get elastically deformed. As such, this recitation does not distinguish claim 23 from the prior art apparatus of JP'246.



Regarding claim 24, Figs. 1-4 show a paper-discharging apparatus to discharge paper from an image forming device having paper-discharging rollers (2a), comprising:

a supporting plate (5 in Fig. 1 or b in Fig. 4) positioned at a paper-discharging port side of the image forming device and fixedly mounted at opposite ends thereof to the image forming device; and

a supporting bracket (including 6 in Fig. 1 or including d in Fig. 4) including idle rollers (3a) facing the paper-discharging rollers (2a), the supporting bracket (including 6 or including d) flexibly mounted at a middle portion thereof to the supporting plate (5 or b) to maintain a constant contact pressure between the idle rollers (3a) and respective paper-discharging rollers (2a).

Regarding claim 25, Figs. 1-4 show that the supporting plate (5 or b) has a supporting plate axis disposed substantially parallel to at least one of a first center axis of the idle rollers (3a) of the supporting bracket (including 6 or including d) and a second center axis of the discharging rollers (2a), and the supporting plate axis of the supporting plate (5 or b) becomes disposed not to be parallel to the at least one of the first center axis and the second center axis according to a force exerted on one of the supporting plate (5 or b) and the supporting bracket (including 6 or including d) while the first center axis and the second center axis are maintained substantially parallel to each other.

2. Claims 1 and 10-25 are rejected under 35 U.S.C. 102(b) as being anticipated by Japanese Publication No. 5-43082 (hereinafter "JP'082").

Regarding claim 1, Figs. 1-5 show a paper-discharging apparatus used with an image-forming device, the paper-discharging apparatus provided with paper-discharging rollers (26) and idle rollers (33) disposed in a paper-discharging port side of the image forming device, in which a sheet of paper is discharged through the paper-discharging rollers (26) and the idle rollers (33), the paper-discharging apparatus comprising:

- a supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) coupled at opposite ends thereof (see Fig. 5) to the image-forming device and installed at the paper-discharging port side of the image-forming device;

- a supporting bracket (30) coupled to the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) to rotatably support the idle rollers (33) facing the paper-discharging rollers (26); and

- a spacing adjustment unit (including 32 and 34) disposed between the idle rollers (33) to constantly maintain a contact pressure between the paper-discharging rollers (26) and the idle rollers (33).

Regarding claim 10, Figs. 1-5 show a paper-discharging apparatus to discharge a sheet of paper between a paper-discharging roller (26) and an idle roller (33) which are disposed in a paper-discharging port side of an image-forming device, comprising:

- a supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) formed on the paper-discharging port side of the image-forming apparatus having opposite ends thereof fixedly coupled to the image-forming apparatus (see e.g., Fig. 5);

a supporting bracket (30) having a middle portion formed between opposite ends thereof, on which the idle roller (33) is rotatably mounted to contact the paper-discharging roller (26); and

a spacing adjustment unit (including a and 31) to flexibly couple the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30) to adjust a distance between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30) when an external force is exerted on one of the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the supporting bracket (30). Thus, all of the limitations of claim 10 are met by JP'082.

Alternatively, in claim 10 in the recitation, "a spacing adjustment unit to flexibly couple the supporting plate and the middle portion of the supporting bracket **to adjust a distance between the supporting plate and the middle portion of the supporting bracket when an external force is exerted on one of the supporting plate and the supporting bracket**, the bolded portion of this recitation is a "conditional limitation" that need not ever occur. For example, an external force may never get exerted on the supporting plate or the supporting bracket. Since this condition may never occur, this bolded portion of this recitation does not distinguish claim 10 from the prior art apparatus of JP'082.

Regarding claim 11, Figs. 1-5 show that the spacing adjustment unit (including a and 31) controls the supporting bracket (30) to maintain a contact pressure generated between the paper-discharging roller (26) and the idle roller (33) constant while

adjusting the distance between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30).

Regarding claim 12, Figs. 1-5 show that the middle portion of the supporting bracket (30) is spaced-apart from the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) by the distance in a direction perpendicular to the paper disposed between the paper-discharging roller (26) and the idle roller (33).

Regarding claim 13, Figs. 1-5 show that when the external force is exerted on one of the supporting plate and the supporting bracket, a portion of the supporting plate moves toward the middle portion of the supporting bracket while a distance between the middle portion of the supporting bracket and the paper-discharging roller is maintained constant. More specifically, in the recitation "wherein **when the external force is exerted on one of the supporting plate and the supporting bracket**, a portion of the supporting plate moves toward the middle portion of the supporting bracket while a distance between the middle portion of the supporting bracket and the paper-discharging roller is maintained constant", the bolded portion of this recitation is a "conditional limitation" that need not ever occur. As explained above in the rejection of claim 10, an external force may never get exerted on the supporting plate or the supporting bracket. As such, this recitation does not distinguish claim 13 from the prior art apparatus of JP'082.

Regarding claim 14, Figs. 1-5 show that the spacing adjustment unit (including a and 31) comprises:

an elastic member (31) disposed between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30) to elastically adjust the distance between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30).

Regarding claim 15, Figs. 1-5 show the spacing adjustment unit (including a and 31) comprises:

a plurality of elastic members (31 and 31) disposed between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30) to elastically adjust the distance between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion of the supporting bracket (30).

Regarding claim 16, Figs. 1-5 show that the elastic members (31 and 31) are disposed between the opposite ends of the supporting bracket (30) at a predetermined interval.

Regarding claim 17, Figs. 1-5 show that the elastic members (31 and 31) are compressed by different amounts to have different amounts of elastic potential. This can occur, for example, when non-uniform thickness sheets are fed. One of the elastic members (31) can be compressed by a different amount than that of the other elastic member (31).

Regarding claim 18, Figs. 1-5 show that the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) elastically moves toward the supporting

bracket (30) according to an elasticity of the elastic member (31) while a distance between the paper-discharging roller (26) and the idle roller (33) is maintained constant.

Regarding claim 19, Figs. 1-5 show a paper-discharging apparatus to discharge a sheet of paper between a plurality of paper-discharging rollers (26) and a plurality of idle rollers (33), which are rotated by corresponding ones of the paper-discharging rollers (26) in an image-forming device, the paper-discharging apparatus comprising:

- a supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) formed on a paper-discharging port side of the image-forming device having opposite ends thereof mounted on the image forming device (see e.g., Fig. 5);

- a supporting bracket (30) having a middle portion formed between opposite ends thereof, on which the idle rollers (33) are rotatably mounted to contact corresponding ones of the paper-discharging rollers (26); and

- a spacing adjustment unit (including a and 31) disposed between the middle portion of the supporting bracket (30) and the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) to flexibly couple the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) with the middle portion of the supporting bracket (30) to maintain a contact pressure generated between corresponding ones of the paper-discharging rollers (26) and the idle rollers (33) regardless of an external force exerted on one of the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the supporting bracket (30).

Regarding claim 20, Figs. 1-5 show that a distance between the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the middle portion

of the supporting bracket (30) varies according to the spacing adjustment unit (including a and 31) while the contact pressure is maintained constant.

Regarding claim 21, Figs. 1-5 show that the middle portion of the supporting bracket (30) is spaced-apart from the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) by a distance which varies according to deformation of the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5).

Regarding claim 22, Figs. 1-5 show that a distance between the middle portion of the supporting bracket (30) and the paper-discharging rollers (26) is maintained constant.

Regarding claim 23, Figs. 1-5 show that the middle portion of the supporting bracket (30) is not deformed in a direction perpendicular to an axis passing through a center of each of the paper-discharging rollers (26) while the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) is elastically deformed. Regarding the recitation "wherein the middle portion of the supporting bracket is not deformed in a direction perpendicular to an axis passing through a center of each of the paper-discharging rollers while the supporting plate is elastically deformed", the bolded portion of this recitation is a "conditional limitation" that need not ever occur. For example, the supporting plate may never get elastically deformed. As such, this recitation does not distinguish claim 23 from the prior art apparatus of JP'082.

Regarding claim 24, Figs. 1-5 show a paper-discharging apparatus to discharge paper from an image forming device having paper-discharging rollers (26), comprising:

a supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) positioned at a paper-discharging port side of the image forming device and fixedly mounted at opposite ends thereof to the image forming device; and

a supporting bracket (30) including idle rollers (33) facing the paper-discharging rollers (26), the supporting bracket (30) flexibly mounted at a middle portion thereof to the supporting plate (30) to maintain a constant contact pressure between the idle rollers (33) and respective paper-discharging rollers (26).

Regarding claim 25, Figs. 1-5 show that the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) has a supporting plate axis disposed substantially parallel to at least one of a first center axis of the idle rollers (33) of the supporting bracket (30) and a second center axis of the discharging rollers (26), and the supporting plate axis of the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) becomes disposed not to be parallel to the at least one of the first center axis and the second center axis according to a force exerted on one of the supporting plate (unnumbered plate to which element a is connected in Figs. 3-5) and the supporting bracket (30) while the first center axis and the second center axis are maintained substantially parallel to each other.

### ***Response to Arguments***

3. Applicant's arguments with respect to claims 1-25 have been considered but are moot in view of the new ground(s) of rejection.



***Allowable Subject Matter***

4. Claims 7-9 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

5. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thomas A. Morrison whose telephone number is (571) 272-7221. The examiner can normally be reached on M-F, 8am - 5pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick Mackey can be reached on (571) 272-6916. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

12/13/2007



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